

CALIFORNIA POWER AUTHORITY
STATE FACILITY SOLAR ENERGY SALES PROGRAM
DRAFT REQUEST FOR BID – JULY 11, 2003

1. OVERVIEW

1.1 Summary of Program Objective, Goal and Schedule

We have embarked on a process to enable state agencies to meet their goal of implementing all cost effective solar PV projects, while providing the solar industry the flexibility and creativity necessary to achieve the lowest overall price. ***Note that any mention of solar “PV” technology throughout this RFB is not meant to exclude other forms of on-site solar electric technology that lend themselves to installations of 1 MW or smaller.*** We have done extensive groundwork both within State government and with the solar industry and financial community to pave the way for this program to succeed.

To this end, the California Power Authority (“CPA”) is pleased to announce this **Draft Request for Bids** (“RFB”) for the solicitation of third party-owned solar PV (or decentralized solar) to be installed in various state agencies’ facilities. We intend this draft document to lay out our intended bid and structure to allow interested parties to comment on our process and approach in order to best shape a successful final bid document.

- Questions via e-mail or fax are invited through July 25.
- A meeting will be held on: **Monday, July 28 at 1:00 p.m.**
Hearing Room
901 P Street (9th and P Streets)
Sacramento, CA 95814

to discuss and resolve comments, suggestions, and improvements suggested to the RFB. ***We invite your input prior to this meeting*** in order to discuss resolutions and improvements during the scheduled meeting.

- Comments should be directed to **both**:
Jeanne Clinton **and** Mark Fillinger
Tel: (916) 651-9750 Fax: (916) 651-9595
E-mail: Jeanne.clinton@dgs.ca.gov & mark.fillinger@dgs.ca.gov

Program and RFB Objective

The goal of this RFB is to select a limited set of solar providers willing to install, own, and finance solar PV projects at approved state agency locations and sell the electrical output to the applicable agency on a \$/kWh basis. Systems will be owned and maintained by the bidder who will provide the electrical output to the agency on a take-or-pay long-

term contract basis. We anticipate solar providers will want up to 20-year pay-for-delivered solar power purchase agreements from the host sites (bidders may propose other terms). Under this arrangement the site must “take” all solar output produced, but may be able to send any surplus back into the grid via a “net metering” arrangement with the serving utility or energy service provider.

Selected providers (“Solar Providers”) effectively will be granted a “license to sell solar energy” to state agencies, and will have two methods of securing solar PV projects:

- 1) by responding to specific requests from various state agencies to affirm installation feasibility at the bid price (with necessary variances as permitted below) and/or
- 2) Proactively developing and presenting project proposals to any interested state agencies (and potentially a larger set of public agencies at a later date).

The selected Solar Providers will be authorized to arrange for solar installations at state agencies without further competitive bidding, subject to meeting any specific approval or contractual documentation requirements for the applicable state agency. Similarly, state agencies will be able to contract directly with a selected Solar Provider for a solar energy power purchase agreement without further competition. In all cases each state agency retains the final decision whether to enter such an arrangement for any particular facility. Nothing prevents the agency from comparing the pros and cons of solar installations bid into more than one solar category, where different Solar Providers may have been selected. (E. G., an agency may compare a high-efficiency to low-efficiency solar technology, or may compare roof-mount with carport-style installations.)

After an initial period in which the program and contract documents become established, the CPA envisions opening up access to the solar providers and their bid terms to any public agency in California desiring to make use of this solar installation program. Eligible agencies that choose to participate could include cities, counties, school districts, community colleges, and a variety of special purpose districts (e.g. water, wastewater, parks and recreation, etc.). We have not designed this program to include federal facilities, though we have no objection to their inclusion if the program meets their procurement rules.

Goal

The two-year program goal is to install 10+ MW at or below an effective solar price of 12 cents/kWh, and preferably at or below 10 cents/kWh. We expect the program if well priced could install up to 50 -75 MW in State facilities by the end of 2006, and multiples of this in local public agencies.

Anticipated Bidding Schedule

1.	Receive comments from client state agencies on proposed program and bidding approach	July 3
2.	Release Draft RFB document for comment	July 11
3.	Receive comments & suggestions on Draft RFB	July 25
4.	Hold open meeting (or conference call) to discuss possible solutions to issues raised about RFB	July 28
5.	Issue Final RFB for Third Party Solar PV	Week of August 4
6.	Final bids due	Is 4 weeks enough, after 3-week draft review?
7.	Solar Providers selected	Fall 2003

1.2 Background

A 2001-02 Power Authority Request for Bid envisioned that State agencies would make commitments to outright purchase decentralized solar installations on a large scale (e.g. 80 MW over 4-5 years). This assumption proved to be unattainable due to several factors:

- Emerging realization of capital budget constraints/economic malaise hitting public sector budgets
- Spot power markets were in deep price decline, calling into question whether the ceiling prices bid by solar companies would be cost-competitive with power prices paid
- Publicly-owned solar facilities are not able to utilize state and federal tax credits and accelerated depreciation available to private owners of solar systems
- The State Department of Finance was averse to any state capital outlay that might not be cost-effective in a foreseeable time frame, rather than over the long period of time that solar systems would be owned. This concern involved both performance risk and economic risk, coming at a time of budget concerns and power market price declines, as mentioned above.
- All of these conditions combined led the CPA to conclude that state agencies were not ready to commit to purchasing up to the 80 MW of decentralized solar, a volume goal the CPA had envisioned to be available to solar bidders. Moreover, CPA did not have the staff or budget resources to aggressively solicit this level of purchase orders in advance of proceeding with a bid process premised on getting favorable pricing for a large volume of solar installations.

1.3 Early Target Participants

The CPA has lined up expressions of interest in the program from a large variety of State agencies and facilities, if the solar price offered is competitive with the current and expected near-term power prices. We have letters of interest from:

- California State University System
- California Department of Transportation
- Youth & Adult Corrections
- Department of Mental Health
- State and Consumer Services Agency for its Department of General Services [forthcoming]
- University of California.

Together these agencies have the potential for 10+ MW of solar installations in the next two years, and 50+ MW overall. Of course interest is subject to seeing favorable solar pricing. (Please see the link provided in Appendix C to view the agency letters of interest.)

The summary table below indicates the agencies, potential types of facilities, estimated solar MW potential, and the approximate price points for each agency based on current retail power tariffs. Please note that the information in this table targets facilities served by investor-owned utilities (IOUs) where retail prices are higher than in municipal utility areas.

1.4 Eligible Bidders/Teams

This is an open solicitation that includes as eligible bidders all those firms placed on the CPA's Eligible Bidders List for Decentralized Solar Technology in Spring 2002. Firms on that list may incorporate by reference any business and technical information submitted in January 2002 for that bidding process. Such firms also may update/refresh any information in those bids (e.g. technology to be used, partners, etc.) Because the nature of the current RFB is substantially different (third-party ownership), the price information submitted to the CPA in 2002 is no longer relevant.

Additional firms that were not included in the above Eligible Bidders List are invited to submit bids in this current Third-Party Solar RFB, and must of course, submit all the information requested in this RFB.

Minimum bid size: To be eligible, each bid team must display the capability to install a minimum of 500 kW of solar systems on state facilities per year. In the case of ties, priority will be given to bidders able to deliver higher volumes of solar systems.

**Preliminary Estimates of Potential Agency Participation,
Subject to Meeting Their Competitive Price Points for Retail Electricity Purchases**

Agency	Potential Sites	Solar MW and \$ Value¹		Price Point
Corrections	Estimates 25 of 33 facilities @ 1 MW (10 acres) PV potential each (of 2-3+ MW loads). Already have significant peak load management.	25 MW – probably ground mounted outside core area, but within fence \$150 million, but runs against IOU incentive limit of 3-4 MW/year (\$18-24 mil/yr).		Prefers solar at discount from IOU TOU rates. Average tariffs need to beat 10-12 cents/kWh; daytime effective rates may be 12-15 cents now w/ demand charges, if demand drop guaranteed.
CalTrans	Start with feasibility among 20 district office buildings on TOU rates. 4 buildings not practical (too high or to be replaced); assume 7-8 key buildings with total demand of 1.6-3.1 peak MW.	Initial max. target of 16 bldgs @ 100-200 kW solar each or 1.6-3.2 MW = \$10-20 million. If can produce 20% of initial 8 target buildings = 320 kW – 620 kW = \$2-3.7 million		20 largest facilities pay avoided TOU costs, with 8-10 facilities in IOU areas; <i>specific applicable rates tbd</i> , but assume 14-16 cents/kWh now, plus some demand charge savings.
UC	Target installations will be on new buildings, in particular. Also some existing buildings. Note: most campuses use TES, which reduces peak demand already.	11 MW technically feasible “over 10-year period”, subject to competing against price points. (Time frame may be for planned NEW building construction) Value of \$60 million.		10.5 cents /avg. kWh (Direct Access all-in costs), for 44% of power. New DA contract 7/03 to have TOU rates, may be up 15 cents on-peak. [Rest obtained from cogen or lower price sources] Little chance to save demand charge w/ 5-6 pm peak & TES systems.
CSUS	23 campuses, 18 in IOU areas, and 6 likely leaders.	Average campus has max demand about 2 MW each; Max potential may be 12+ MW = \$72+ million. If do 20% on 6 initial campuses, then 2.4 MW = \$14 million target.		Same as UC's. 80% load on TOU transmission & primary service w/ average IOU energy charge of 10-12 cents, plus TOU premium, maybe demand. After 1-1.5 year SCE price drop, expects increases.
DGS	7 facilities in IOU areas, from 20 best prospects of 40-50 buildings owned or fully managed by DGS	841 kW identified solar potential. Implies range of \$2.3-\$5 million		Target facilities on various PG&E and SCE rates; initial program not targeting buildings in SMUD and LADWP service areas.
Mental Health	4 hospital campuses, some pitched roofs, some interest in solar carports.	If 3 hospitals w/out cogeneration got 20% of peak demand from solar, would amount to 1.5 MW		All in IOU areas on SCE TOU-8 and PG&E TOU rates. Assume 10-12 cent annual average. Napa State Hospital already has large cogen unit.
Potential Solar PV Installations		Near-term	Longer-term	
		\$ 60-80 mil	\$ 300-400 mil	
		10.5-13.5 MW	50+ MW	

¹ We show \$6.00 per AC output watt (PTC), installed; we expect costs will need to be lower than this to be price competitive.

1.5 Roles and Responsibilities

State Agency/Host Site

- Make final decision on site participation in program
- Lease roof or ground foot-print to 3rd party
- Pay for solar energy output via long-term solar power purchase contract
- Pass any solar/DG incentive to 3rd party

CPA (in conjunction with agency partners)

- Structure the program
- Pre-market program to public agencies
- Select solar vendors/partners
- Establish basic term sheet to incorporate in agency-specific agreements
- Receive transaction fee from Solar Provider

Solar Provider Team

- Finalize feasible sites
 - Provide installation and solar power purchase agreements
 - Execute solar site lease-back agreement, with liability insurance
 - Design/Build/Own *
 - Install metering
 - Finance
 - Maintain
 - Bill host site for solar energy produced
- * Note: Bidders should assume some member of the provider team must own the solar systems for the full term of the agreement. At some future date there may be State interest in ownership conversion, however this is not a near-term possibility.*

Anticipated State Approvals/Requirements

- Department of Finance issues letter to agencies indicating approval for program, subject to certain parameters
- Host agency has or secures authority to enter solar purchase agreement
- Host agency agrees to make solar payments from annual operating budget, subject to typical “non-appropriation” clause (meaning if State budget has not been passed, giving agencies authority to spend their operating budgets, agency is not obligated to make payments until such time as budget is authorized, at which time payments would be made retroactive to beginning of budget year for solar energy already received)
- Host agency’s real estate manager leases roof/ground footprint to solar provider
- Department of Finance informs Legislature of all leases with 4+ year terms

1.6 Transaction documentation anticipated

The CPA and state agencies anticipate the following documents will be required for the eventual transactions expected in this program:

- Draft Term Sheet as guidance for solar power purchase agreement

- Ground/roof lease from host site to solar provider,
- Solar power purchase agreement,
- Installation agreement and pricing details
- Operation & Maintenance (O&M) agreements
- Proof of solar provider's liability insurance

Most agencies desire to work with a Master Agreement to which exceptions and differences can be attached in agency-specific exhibits.² Attached to this RFB is a sample Master Agreement developed by the California Department of General Services, with some modifications to suit this solar program. Bidders should consider this to be a starting template and are encouraged to outline any changes or variations they would propose for a master set of solar power agreements.

Please note that the CPA has established a state agency solar users group to advise on this RFB, and to ensure the program's success. Once solar providers are selected, each agency will designate a single contact person to coordinate subsequent discussion with prospect agencies/department host sites, arrange site access, facilitate feasibility determinations, and negotiate agency-specific agreements.

1.7 Other Considerations

Capturing lower peak demand charges

It may be critical to the decision economics of some agencies to be able to count on utility bill "credit" for any avoided demand charges. The facilities represent a wide spectrum of load profiles and operating hours, where some facilities have peak loads in the 1-3 p.m. time frame, and others peak at 5-6 p.m. We invite bidders to present information on any demand reduction guarantees they offer, or alternatively what optional mitigation measures might be offered – such as integrating the solar system with energy management systems, battery back up, monetary guarantees. IN addition, bidders may indicate the extent to which their solar systems have atypical impacts on demand savings – such as might occur with direct current (DC) power systems tied into the facility power system.

Adding efficiency measures to enhance economics of a "solar/efficiency bundle"

Some solar providers suggested that we permit bids combining solar and efficiency measures so as to improve the overall economics of potential projects. While one or two State agencies welcome this, most agencies believe that it adds excessive complexity to the nature of this transaction. ***We invite bidders' comments on whether this feature should be included or excluded in the final RFB.***

² There may be variations in standard agreement desired for (e.g.) term of agreement, buy-out provisions, and/or option to relocate solar facility in event of significant alteration to facility site.

The argument for:

In order to allow for flexibility and creativity in the ability of bidders' responses to meet host site goals for the lowest overall energy price, we could allow solar bidders to offer optional energy efficiency measures that can be combined with the solar systems to achieve better cost-effectiveness and/or a lower overall price per commercial kWh saved/avoided. Such measures might be limited to **25%** of the project's overall cost (so as not to lose sight of the solar purpose of the program), and could be priced separately to allow for full transparency to host sites of the costs and benefits. Bidders of optional efficiency measures would need to provide a methodology for how they would measure the savings from such projects and how they would price these in a bundled solar \$/kWh bid price.

Note: There would be no obligation for bidders to offer these optional measures. If efficiency measures were accepted and offered, ***selection of Solar Providers would be based on the solar price alone.***

The argument against:

Permitting efficiency measures to be included in bids would overly complicate the relative simplicity of the solar bid envisioned. It would add complexity to agency participation because of the need to review audit findings and approve engineering recommendations for efficiency measures. This would be overly burdensome on those agencies seeking to buy solar energy. It would be hard to price and meter "negawatts" to include these somehow in a price for energy improvements per kWh of benefit. Moreover, trying to arrange a "footprint" lease for the portion of facilities where a private party would install and own efficiency measures would be highly problematic, and would potentially cause entire facilities to bear liens for the value of the energy improvements.

In no circumstances should the terms of a solar installation discourage or prohibit a facility's taking additional energy efficiency actions.

Self-Generation Incentive Program (or Other Incentive) Applicability and Limitations

The program assumes that participating sites in investor-owned utility (IOU) service areas will take maximum permissible advantage of California incentives for installation of solar systems.³ (All bidders, of course, should seek to take maximum advantage of any other incentives, such as state and federal tax credits and depreciation.) To the extent that the utility customer of record must apply for any California incentives, the program assumes that participating sites will assign these to the selected Solar Provider.

³ Although not the prime target of this program, facilities served by municipal utilities, such as in Los Angeles or Sacramento, may have access to different incentives. Nothing in this RFB is intended to exclude participation by facilities outside of IOU service areas.

For the convenience of bidders, we summarize below relevant rules of the IOUs' Self Generation Incentive Program as they apply to state agency participation. There are four IOUs in California: PG&E, SCE, SDG&E, and Southern California Gas.

From section 3.4.2 of the Self-Generation Incentive Program Handbook⁴:

Reservation Limitations (emphasis added)

There are restrictions on the amount of incentive funding an Applicant can reserve and receive. Applicants can reserve up to 1.0 MW per program year of incentive funding for a single corporate or government parent Host Customer at any one time within a given investor owned utility's service territory. There are no reservation limits for third party contractors, vendors, or ESCOs applying to the program. However, project size cap limits per Site and corporate or governments parents incentive limits are in force for all projects. Table 3-3 summarizes the limitations on project size.

Table 3-3 Project Size Caps for Each Administrator^{1,2}

Time Period	Project Site Max.	Corporate or Government Parents	Contractor, Vendor, ESCO
Calendar Year	1.5 MW	1.5 MW	None
Program Duration (2001-2004)	1.5 MW	6.0 MW	None

1 These caps are established for each investor-owned utility's territory.

2 State Government Parents are defined as:

- University of California,
- California State University,
- Department of Corrections,
- Department of General Services,
- Combination of the Department of Developmental Services and Cal Trans,
- Combination of the California Youth Authority and the Department of Mental Health,
- all other state agencies and departments.

1. Please also note that legislation is pending in the State legislature to extend this incentive program beyond its current end date of December 2004.

⁴ This comes from an identical handbook used by all IOU utilities administering the CPUC-authorized SGIP. One source is: http://www.senergy.org/docs/Program_Handbook_R3_Final_01-18-03.pdf, and also should be accessible from each utility's web site.

2. PRODUCTS AND SERVICES REQUESTED

2.1 Requested & Permissible Products Bid:

Solar bid categories: Participants will bid in one or more of three decentralized solar installation categories:

- Roof-mounted (preferably non-penetrating),
- Ground-anchored covered parking (“solar carport”) and
- Ground-based open field (e.g. within fence but not in security areas of correctional facility)

The CPA also anticipates selecting providers for two categories of solar technology:

- High efficiency (e.g. silicon cells, tracking systems, and/or concentrating technologies) and
- Average efficiency (e.g. “thin-film” technology).

The reason for this is to permit host sites, when facing space constraints, to choose solar technology to optimize for some minimal solar output, the solar cost per kWh delivered, or a maximum total cost. ***We invite bidders to comment on this distinction, and to suggest a common definition of low + high efficiency categories.***

2.2 Typical Installation Conditions (See Attachment 2)

Bid prices will be based on a “typical” installation for each system as defined in the RFB, Attachment 2.

Our goal is to obtain a firm and specific bid price to cover the typical installation, under the broadest possible set of circumstances. Although we recognize the need to allow price variations when outlier circumstances present, we strongly encourage bidders to keep the identification of variances to a minimum.

Permitted price variances to typical installations: Bidders may offer in their responses specific pricing adjustments (up or down) for substantial variances from the “typical” installation (e.g. for remote locations or where electrical service connections are at some distance). The host site on a case-by-case basis will determine its willingness to accept such variances and associated price adjustments. If unique circumstance of a host facility fall outside both the “typical” installation and the selected provider’s bid variances, the bidder is not obligated to deliver the solar energy at that site under this CPA program. If such a situation arises, the host site retains the option to conduct its own solicitation for solar energy at that site.

2.3 Solar System Specifications

The turnkey responses must include all processes and equipment needed to produce electric power suitable for use by the electrical system of the site. The design of integrating the on-site solar system with the other power sources for the site of

installation will be the responsibility of the bidder. Final project installation proposals for contracts must cover all these and other costs to achieve commercial operation.

Minimum specifications are delineated in Attachment 3.

2.4 Form of Price Bid

This RFB seeks bids on a cents per kWh basis for long-term delivery of solar power produced on-site. The bid may be:

- variable in the form of a guaranteed discount from the then-current retail price for bundled power from the utility distribution company or other designated energy service provider (this is the agencies' most preferred offer).
- fixed and flat (this is the second most preferred offer).
- fixed but "tilted" (at different prices over the period).

Further guidance on the form and specifics of pricing bids is discussed in Sections 3.3 and 4.5.

2.5 Disabled Veterans Business Enterprises – Preference

The state established a 3% Disabled Veteran Business Enterprise (DVBE) Participation Goal to ensure a portion of the state's overall annual contract dollars are awarded to DVBEs. As a certified DVBE you are eligible for the state's 3% DVBE Participation Program, and, DVBE certification status strengthens business networking opportunities via the state's Internet Certified Firm Inquiry Services' certified DVBE query and listing.

DVBE is applicable to this RFB. Documentation is provided here for bidders' informational purposes. To be eligible for certification your business:

- Must be at least 51% owned by one or more disabled veterans;
- Your daily business operations must be managed and controlled by one or more disabled veterans (the disabled veteran(s) who manages and controls the business is not required to be the disabled veteran business owner(s)); and,
- Your home office must be located in the U.S. (the home office cannot be a branch or subsidiary of a foreign corporation, foreign firm, or other foreign based business).

For certification purposes, a "disabled veteran" is:

- A veteran of the U.S. military, naval, or air service;
- Has a service-connected disability of at least 10% or more; and
- Must be a California resident.

Access the online Disabled Veteran Business Enterprise Certification Application (STD. 812), or to receive your hard-copy form by mail, e-mail osbcrhelp@dgs.ca.gov or call (916) 323-5478.

2.6 California Presence: EZA, LAMBRA, and TACPA, and SBPCA

If applicable, identify EZA, LAMBRA, TACPA, and SBPCA information per Section 2.6. For future RFP's and all contracts, these preferences apply. Bidders interested in the Master DS contracts should submit applicable information on preferences that may apply to them. More information can be obtained by contacting osbcrhelp@dgs.ca.gov.

Enterprise Zone Act (EZA)

The Enterprise Zone Act (EZA) allows state contracting officials to give California based companies a 5 percent bid preference when 50% of the labor required to perform commodities contracts or 90% of the labor for services contracts is performed at the approved EZA work site(s). To receive a contract award based on preferences, the company must certify under penalty of perjury that the required contract labor shall be accomplished at the approved work site.

Companies qualifying for the 5 percent work site preference may request an additional 1 to 4 percent workforce preference by certifying to hire a specified percent of their contract workforce labor hours from a targeted employment area, or from enterprise zone eligible employees.

Bidders should contact the city or county economic development office or the State Trade and Commerce Agency at (916) 324-8211 to identify enterprise zone locations. Firms receiving EZA preferences must report their labor hours. Reference the state contract on which the award is based for specific reporting requirements.

Shortcut to EZA Request Form Std. 831: <http://www.osp.dgs.ca.gov/pdf/std831.pdf>

Local Agency Military Base Recovery Area (LAMBRA)

The Local Agency Military Base Recovery Area (LAMBRA) Act provides for two bidding preferences: Worksite and Workforce.

Worksite Preference: LAMBRA provides a 5 percent bidding preference on state solicitations for goods and services valued at more than \$100,000 if the worksite is located in a LAMBRA as designated by the State Trade and Commerce Agency. LAMBRA allows state-contracting officials to award the bid worksite preference when 50% of the labor hours required to perform a contract for goods, or 100% of the labor hours required to perform a contract for services is performed at the approved worksites.

Workforce Preference: Companies qualifying for the 5% worksite preference may request an additional 1% - 4% workforce preference by certifying to hire a specified percent of the contract workforce employees from those designated as LAMBRA qualified individuals (See Assembly Bill 3: Chapter 1012, 9/30/1998). To request workforce preference, the bidder must first identify an eligible worksite. The Office of Small Business Certification and Resources (OSBCR) in the Department of General Services administers the LAMBRA program, and they can be contacted at:

Office of Small Business Certification and Resources
1531 I Street, 2nd Floor
Sacramento, CA 95814-2016
Receptionist: (916) 323-5478
Fax: (916) 442-7855
24-Hour Recording & Mail Request call (916) 322-5060.
E-mail: osbcrhelp@dgs.ca.gov

Bidders should contact the State Trade and Commerce Agency at (916) 324-8211 to identify LAMBRA zone locations. Firms receiving LAMBRA preferences must report their labor hours. Reference the state contract on which the award is based for specific reporting requirements.

Shortcut to LAMBRA Request Form Std. 832: <http://www.osp.dgs.ca.gov/pdf/std832.pdf>

Target Area Contract Preference Act (TACPA)

The Office of Small Business Certification and Resources (OSBCR) is also the administering agency for the Target Area Contract Preference Act (TACPA) program that was implemented in State procurement in 1982. TACPA provides a 5 percent bid preference on service and commodity contracts valued at more than \$100,000 if the business work site is located in a distressed area as designated by the Office of Planning and Research.

The TACPA allows state contracting officials to award California based companies the bid preference when 50% of the labor required to perform commodities contracts or 90% of the labor for services contracts is performed at the approved work site(s). TACPA work sites may be in, or directly adjacent to and forming a contiguous boundary with, the distressed area. To receive a contract award based on preferences, the company must certify under penalty of perjury that the required contract labor shall be accomplished at the approved work site. Companies qualifying for the 5 percent work site preference may request an additional 1 to 4 percent workforce preference by certifying to hire a specified percent of their contract workforce labor hours from among persons with high risk of unemployment.

Bidders should contact the Office of Small Business Certification and Resources at (916) 323-5478, to determine if the worksite(s) is eligible. Firms receiving TACPA preferences must report their labor hours. Reference the state contract on which the award is based for specific reporting requirements.

Shortcut to TACPA Request Form Std 830: <http://www.osp.dgs.ca.gov/pdf/std830.pdf>

Small Business Procurement and Contract Act (SBPCA)

The Office of Small Business Certification and Resources (OSBCR) is also the administering agency for the Small Business Procurement and Contract Act. For specific information regarding this preference allowance for contracts, please contact:

Office of Small Business Certification and Resources
1531 I Street, 2nd Floor
Sacramento, CA 95814-2016
Receptionist: (916) 323-5478
Fax: (916) 442-7855
24-Hour Recording & Mail Request call (916) 322-5060.
E-mail: osbcrhelp@dgs.ca.gov

3. EVALUATION PROCESS/ BID SELECTION

3.1 CPA Primary Contact for Bid Submission

Jeanne Clinton
Tel: (916) 651-9750
Fax: (916) 651-9595
E-mail: Jeanne.clinton@dgs.ca.gov

3.2 Communications Restrictions Once Final RFB Issued

The following section from the Authority's Code of Ethics is provided as clarification to Ex Parte Communications:

Once the Public meeting to discuss the Draft RFB has concluded, any communication from potential/existing bidders must be made in writing and will be publicly posted with the corresponding responses.

Please note: The Authority's Code of Ethics provides:

- a) During the process leading to the award of any contract, no Member or staff shall knowingly communicate concerning any matter relating to the contract or selection process with any party financially interested in the contract, or an officer or employee of that party, unless the communication is (1) part of the process expressly described in the request for proposal or other solicitation invitation, (2) part of a noticed Board meeting or (3) as provided in subdivision (c). Any applicant or bidder who knowingly participates in a communication that is prohibited by this subdivision may be disqualified from the contract award.
- b) The process leading to an award of a contract means the period between release of a final request for proposals or bids through award of the contract.
- c) The procedures and prohibitions prescribed by this section shall not apply to communications that are incidental, exclusively social or do not involve the Authority or its business.
- d) Staff shall provide Board Members with a monthly list of all parties who have bids pending or are involved in contract solicitations, negotiations or reviews such that communication with these parties may be subject to these restrictions.

3.3 Bid Review Process

Bid review panel. The Authority's bid evaluation and due diligence will utilize technical and administrative assistance primarily from other State agency personnel.

Due diligence: The Power Authority, its review panel members, and/or other agents as may be assigned will carry out necessary due diligence to ensure that the representations

made in the highest ranked bids are accurate, feasible, and reliable. This includes confirmation of the qualifications, financial strength, and partnerships proposed, as well as the quality and performance of equipment and systems bid. The Authority reserves the right, at its' sole discretion, to evaluate and select two or more qualified eligible bidders on the basis of the information provided in this RFB and to request further supplemental information from the submitting bidder in order to make such determinations.

“Best and final” negotiation permissible with highest-ranked bids. The Power Authority reserves the right to hold final discussions and negotiations with the highest ranked bids to improve the features of bids to be selected. Such discussions may address team members, services offered, price offered, structure of the transactions, or other related matters as outlined in the selection criteria, below.

3.3 Selection Criteria

Solar Providers will be selected based on their team's qualifications, solar price, delivery capacity, and contract structure. The Authority reserves the right, at its sole discretion, to accept a response that does not satisfy all requirements but which, in the Authority's sole judgment, sufficiently demonstrates the ability to produce, deliver, design, permit, and install a substantial volume of on-site solar projects and to satisfy the major requirements of this RFB.

It is anticipated that the selected bidders will enjoy their status as “preferred providers” to state agencies for two years from the release date of the final RFB.

- The information requested in team qualifications is outlined in Section 4.7 below, and generally include criteria pertaining to experience, financial strength, funding relationships and project implementation capabilities.
- Price will be evaluated on a present value cost of the bid price, with a strong preference for a price discounted from the then-current utility bill over the solar transaction term, or alternatively a fixed price bid. (See discussion below in this section.)
- Delivery capacity involves demonstrated resources necessary to source solar system materials, manage projects, and arrange quality installations for facilities potentially located throughout the State. Section 4 below outlines the information bidders should supply to enable the Authority to evaluate the bidding team's capacity to deliver completed, high-quality solar installations at sites located throughout California. Although no bidder will be excluded if it cannot service the entire state, geographic coverage will be a factor in the final selection of solar providers.
- The preferred contract structure is outlined in the draft term sheet (Attachment 1). The terms will include a pricing mechanism, O&M requirements, end-of- term options, the length of the agreement and any buy-out rights or termination provisions. Bidders are invited to offer more detail on the structure they will use.

Elaboration on the Price Criterion

Our goal is to select up to two Solar Providers in each of the categories outlined below. Selected Solar Providers will be chosen from those solar provider teams meeting the minimum qualifications, and then further selected on the basis of the lowest price for solar energy on a cents/kWh basis.

[Bidders are requested to advise how we might define “average efficiency vs. high efficiency”, more so than:

- High efficiency (e.g. silicon cells, tracking systems, and/or concentrating technologies) and
- Average efficiency (e.g. “thin-film” technology).]

Technology	Roof-Mount (non-penetrating pref.)	Carport (w/ support structure)	Open Field Ground-Mount
Average efficiency	Low bid #1 Low bid #2	Low bid #1 Low bid #2	Low bid #1 Low bid #2
High efficiency	Low bid #1 Low bid #2	Low bid #1 Low bid #2	Low bid #1 Low bid #2

We expect that all work requests will go first to “low bid #1” solar provider, with the second-ranked firm receiving work when the lowest bidder is unable or unwilling to meet the host site’s needs. CPA will establish a complaint/quality assurance tracking system so as to eliminate any selected providers if they consistently decline to enter contracts or receive significant complaints about delivering quality service.

It is likely that selected providers may be the low-bid in multiple categories. Such an outcome would be administratively easier of course, and increase the likely volume of work for firms winning in multiple categories.

As stated in Section 2.2 above, we seek price bids that cover broad, inclusive circumstances for typical installations. Our pricing criterion will place emphasis on simplicity. ***Recognizing that we are requiring solar power bids on a per kWh basis, in this Draft RFB, we invite specific comment and suggestions on the degree to which we should structure the format for price submissions to consider one or more of the following:***

- Is it necessary to bid different prices for regions with widely different annual insolation hours? If so, please suggest a “base case” for locations with to insolation hours, as per some standard reference source)
- Do we need to allow different pricing for systems of different sizes – e.g. 100 kW, 250 kW, and 1 MW? Three solar companies in earlier feedback to the CPA indicated that once you get over a threshold size (differently mentioned as 30 kW, 75kW, and 100 kW), there is little additional price differentiation for larger installations.

- As per Section 2.2, bidders may offer specific pricing adjustments (up or down) for substantial variances from the “typical” installation (e.g. for remote locations or where electrical service connections are at some distance). What categories of costs should be allowed, and if so, what parameters should define the “base case”? Note that Appendix A summarizes the locations within California of the major State facilities that might participate in this program.
- As per section 1.7, agencies are assuming they will be eligible for certain levels of California solar incentive payments for these projects, up to certain limits. Should we ask bidders to quote a second set of prices if these incentives were used-up by the agency or issuing utility, or otherwise not available?

3.4 Confidential or Proprietary Bidder Information

All submittals and the information therein become the property of the Authority upon submittal. Proposals shall be returned only at the Authority’s sole discretion and at the vendor’s expense. The Authority will employ reasonable efforts to hold portions of the responses specifically identified and marked as “Confidential” in confidence to the extent permitted by law, until such time as final awards are made and contracts signed pursuant to subsequent RFP’s contemplated by this RFB, at which time these responses will become public records, available for review by the public. Upon request the Authority will return or destroy confidential information that is a trade secret or privately held company's financial information prior to announcing the selected suppliers. "

4. BIDDER SUBMITTAL REQUIREMENTS

Responses to this RFB must be submitted in writing, and signed by an authorized officer or agent of the bidder. All responses should have “State Solar Request For Bid Response” marked clearly and prominently on the envelope. The Authority must receive ten (10) copies of the bidder’s package no later than the close of business day on September **tbd**, 2003. Responses submitted after this date cannot be accepted, and responses that are incomplete or do not conform to the requirements of this RFB will not be considered. The Power Authority values succinct communication, and offers page-length guidelines for each section.

Each bidder shall include a transmittal letter signed by a party authorized to sign binding agreements for projects of the nature ultimately contemplated by this RFB. The letter shall clearly indicate that the bidder has carefully read all the provisions in this RFB and, that by submitting a response, it agrees to be bound by them. The letter should further specify which configuration category (categories) the bidder is proposing (e.g. roof, carport, ground-mount).

Responses shall be submitted to:

California Consumer Power and Conservation Authority
Attn: State Solar Request For Bid Response
901 P Street, Suite 142A

Sacramento, CA 95814

All questions related to the final RFB shall be directed in writing via e-mail or fax, no later than [tbd] , to:

Jeanne Clinton (overall bid document questions) or

Mark Fillinger (questions related to bid pricing, financial terms, and ...)

Tel: (916) 651-9750 Fax: (916) 651-9595

Jeanne.clinton@dgs.ca.gov or mark.fillinger@dgs.ca.gov

4.1 Executive Summary of Bid (max. 2 pages)

All bidders are requested to submit a two-page executive summary of their proposal.

4.2 Solar Equipment & Installation Technical Descriptions (max. 6 pages, including explanation of any exceptions to RFB Attachment 3 Minimum Solar Technical Specifications. Bidder can submit a separate attachment with technical brochure or material, if desired.)

All on-site solar systems offered are expected to meet the specifications described in Attachment 3. Bidders must indicate in their submittals either that (i) they will comply with all the provisions listed in Exhibit B or (ii) they cannot comply with certain of the provisions, identifying specific provisions with which they cannot comply. When preparing subsequent specific site agreements, additional site-specific conditions may dictate additional or different specifications, to be agreed upon with the host site. Bidders must describe the technology(s) that they expect to use for their proposed installation configurations, and respond to the technical questions listed in Form 1.

A. Technology

- Materials solar array or collector, inverter, key balance of system components)
- Efficiency (both cells & systems)
- Sizes and maximum volumes offered

A bidder must specifically describe the technology in detail (including expected system efficiency and output performance over time, using Form #1), and as per section 4.7 below their experience and qualifications as applicable to the technology bid and the bidder's organizational team regarding technology manufacturing, design, installation and maintenance. Bid response should indicate the aggregate capacity of their completed projects for equivalent commercial installations.

If applicable, indicate any other benefits your system provides that other systems might not provide; only identify benefits that can be readily measured and confirmed by an independent engineer.

B. Framing/Support

- Which of three configurations you propose (roof, carport, ground-mount) and using what framing or support systems for each
- Roof-mounted systems may, but are not required to include non-penetrating installations. Please describe any roof penetration required.
- Do you plan a different flat or tilted mount than the minimum specifications call for?

C. Supplier restrictions to your bid

- E.G., min/max installed system size, geographical limits on installations, installation capacity/year, etc.

D. Timelines

Please indicate timelines that you can commit to for

- a) Conducting site feasibility confirmation,
- b) Preparation and finalization of site-specific solar purchase agreement and
- c) Design/installation of the type systems you bid.

E. Ensuring power demand savings

Please describe any included or optional measures to help ensure economic savings from reduced utility power demand charges.

F. Optional Efficiency measures

Please describe any such measures that you choose to offer in a bundle with solar system installation

4.3 Sales & Feasibility Approach (max. 1 page)

Bidders shall provide a description of their solar project sales process and project implementation plan. Such a description should include

- The process, timing and need for state agency host participation.
- What types of personnel will work on these tasks, and where this work will occur (e.g. solar provider office, host headquarters, or host site).
- An example of a preliminary schedule detailing the time required for project planning, design, utility interconnection agreement (if necessary), permitting, site preparation, construction, start-up/commissioning, and system completion.

4.4 Operation, Maintenance and Service Plans (max. 1 page)

The bidder will provide Operation and Maintenance (O&M) services for the full term of the agreement. Please reference the minimum O&M specifications in Attachment 3. The cost for such services shall be included in the energy sales price. Bidder shall describe its experience providing O&M services for solar installations and shall provide information

on the personnel providing such services. Bidder should also discuss its proposed method of monitoring, diagnosing and tracking the energy output of the system. Information should include, but not be limited to:

- Description of O&M services to be provided
- Identification of O&M personnel
- Frequency of service visits

4.5 Pricing (max. 2 pages, plus Form 2, plus any comments or sample power purchase agreement)

Price format

Bidders shall provide a formula and description of their proposed price methodology. Pricing shall be provided on a \$/KWh basis and shall describe any tracking or adjustment methods such that the price can be computed on a net present value basis. Bidders will describe their pricing structure as fixed-flat, fixed-“tilted” or variable, as described in Section 2.4. The submission shall be shown on Form 2.

Power Authority Fee to be Included

Bidders shall incorporate into their pricing the following program development fee, payable to the California Power Authority:

Program Development Fee: \$100/kW payable at project completion

Example: for a 250 kW project this would be \$25,000, and can be amortized into the solar power purchase agreement price

Potential Revenue from Renewable Energy Credits

California Public Utilities Commission and California Energy Commission are on track to decide by December 2003 how to treat the renewable attributes of renewable distributed generation under the state’s Renewable Portfolio Standards. For now, all bidders should assume a \$0 value for potential Renewable Energy Credits (RECs) in their prices.

However, Bidders should propose how the REC value would be applied to their price if a market for RECs develops. For example, the REC value could be held by the state agency or, if the REC were to be passed on to the Bidder, describe how the value would be translated into a discount back to the host from the bid price.

Sample Solar Power Purchase Agreement (no page limit)

Attached for your review and comment is a sample solar power purchase agreement, revised from a more generic distributed generation agreement developed by the Department of General Services. We request that all bidders identify additions or deletions that you would like to see. Additionally, we encourage bidders to submit your

own draft solar power purchase agreement for our consideration if it contains essentially the same provisions as in our draft.

4.6 Protections & Assurances (max. __ pages, plus Form 3)

Please indicate in the cover letter to your bid response that you have read, understand and agree to abide by the provisions and requirements of Section 4.6 of the RFB.

Insurance Requirements

At a minimum, Provider is required to supply insurance as itemized below:

- General Liability Insurance - Not less than \$1,000,000-\$10,000,000 per occurrence/\$2,000,000-\$10,000,000 aggregate or \$2,000,000-\$10,000,000 combined single limit, naming the District and its officers, agents, and employees as Additional Insurers.
- Commercial automobile insurance - \$1,000,000
- Worker's compensation - Statutory
- Employer's Liability:
 - \$500,000 each accident
 - \$500,000 disease – Policy Limit

The amount of insurance required will range from \$1 Million to \$10 Million depending upon the size of the project. The insurance shall be considered primary coverage and any other insurance shall be excess coverage thereof. An admitted California insurance company with a current Best's Key Rating of A-minus (A-) or better shall cover such insurance. The selected Provider shall be responsible for any and all uninsured losses. All insurance shall be provided at the sole cost and expense of the selected Provider unless the requirement is modified or waived by the District.

Contractor's License and Subcontractor Information (Complete Form 3)

The Contractor shall be an individual or firm licensed to do business in California and shall obtain at his/her expense all license(s) and permit(s) required by law for accomplishing any work required in connection with this contract.

The following license(s) is required for this solicitation:

- At a minimum, the installation contractor must have a C-46 solar contractor license.
- If any systems are installed pursuant to CEC incentives (e.g. up to 30 kW), the CEC's "Emerging Renewables Program Guidebook" requires that contractors must have an active A,B, or C-10 license, or a C-46 license for photovoltaic systems. In addition, the CEC requires that contractors be certified to the testing requirements of the photovoltaic protocols that the North American Board of Certified Energy Practitioners is in the process of establishing.
- For ground-mounted solar installations, a Class B license is required.

Please complete information requested in Form 3. The state reserves the right to approve subcontractors.

Prevailing Wages

The vendor, and any subcontractor thereof, shall pay the rate of wages for regular, overtime and holiday work plus employer payments for all benefits generally prevailing in the locality in which the work is to be performed, as determined by the State of California, Department of Industrial Relations, for all crafts, classifications or types of workmen used on the ordering agency premises at the point of delivery by the vendor, or subcontractor, for the assembly and installation of the materials purchased under this agreement.

The bidder shall comply with the Laws and Regulations governing the payment of prevailing wage as identified in the Labor Code, Part 7 (Public Works and Public Agencies), Chapter 1 (Public Works). Copies of the prevailing rate of per diem wages are on file at the Department of General Services Procurement Division headquarters and shall be made available to any interested party on request.

Performance Bond (*The following typical State contract language may apply. Bidders are invited to comment on whether any modification is warranted for third-party owned systems.*)

Before starting installation, the contractor must obtain and provide a payment bond on Standard Form 807. The bond shall be 100% of the total amount of the contract price for equipment and labor.

Workman's Compensation Certification

By signing and submitting a bid, the bidder certifies that they are aware of the provisions of Section 3700 of the Labor Code which requires every employer to be insured against liability for workman's compensation or to undertake self-insurance in accordance with the provisions of that Code, and will comply with such provisions before commencing the performance of the work of this contract.

4.7 Solar Provider Team Organization and Qualifications (max. 6 pages, plus specifically-referenced resumes, financial statements, etc.)

Each bidder should provide information and explanation of the bidder's team and its qualifications, addressing:

A. Lead bidder and contact information

Name the team member who will be the lead negotiator and will sign all agreements with the State agencies.

B. Description of Team Roles & Organization Chart

Include responsibilities for contract management, sales team, feasibility/design, equipment sourcing, integration, installation, financial team, capital source(s), solar energy billing. Each bidder shall provide the following information regarding its company and team:

- Names of team member(s), major subcontractor(s) and supplier(s)

- Roles and relationships of the team members (names of current or proposed owners, partners, shareholders of primary company and subcontractor as well as names of all current or proposed affiliate or parent companies of the team). The response should include ownership information and an explanation of any significant relationships between or among team member organizations.
- Resumes for key employees expected to work on projects

C. Experience with related business transactions

For each firm or key individual, as applicable, indicate:

- Total kW of on-site solar PV placed in commercial operation or practical demonstration,
- All turnkey projects placed in commercial operation or practical demonstration.
- Whether the company and/or its officers or principals are party to any lawsuit involving the performance of any equipment it has installed; if so, please include a summary of the issues and status.
- For solar panels and inverters, a description of the proposed manufacturers, including relevant current and historical financial information of that manufacturer that may affect the bidder's ability to provide the required volume of solar material.

D. Capitalization of bidding team

Include as separate referenced attachments:

- Annual report &/or audited financial statement showing the three (3) most recent accounting years;
- Bidder's demonstrated bonding capacity or other financial strength sufficient to support the offerings described in the bidder's bid.

E. Ability to Support Statewide Installations

Recognizing that potential installations could occur across the state, bidders shall discuss specific methods of handling feasibility, installation, commissioning and operation and maintenance of these projects. This discussion should include mention of the geographic base (bases) from which the bidder's team will work. If any remote monitoring or diagnosis will be employed, please describe this.

F. References

Provide at least three and no more than five client references for turnkey public agency projects, of the size and types indicated in this RFB. For each project indicate

- The project capacity, primary component manufacturers, and installed cost
- The name, title and phone number of the individual at the customer company who the Authority can contact as a reference (such references may be checked for performance, quality of service and satisfaction of contract obligations).

4.8 Description of Anticipated Capital Finance Structure (max. 4 pages plus attachments)

Please provide information relating to your proposed financing structure. We understand that third party funding of solar energy projects is not routine and bidders are encouraged to provide additional information that may be relevant to support the team's ability to provide such financing. Please provide the three most recent years' annual reports or audited financial statements for all financing team members.

Information to help evaluate bidder's ability to provide the necessary long-term financing should include:

- Description of financing structure
- Identification of funding sources, with contact information
- Examples of previously funded solar projects (description, location, host, etc.)
- Commitment letter from anticipated funding source(s)

5. GENERAL RULES

5.1 CLARIFICATIONS. A potential bidder may request clarification of any provision in this RFB. Unless the State deems such clarification to be trivial in nature, any such clarifying questions and the State's response thereto will be addressed as an Addendum to this RFB. In no event can a bidder rely on oral representations if such representation conflicts with RFB including any Addenda.

5.2 ADDENDA. The State may modify any part of this RFB prior to the date indicated for submission of responses. Any addendum will be in writing and will be issued to all bidders who have received this RFB. Addenda will be consecutively numbered.

5.3 NO OBLIGATION; CANCELLATION AND RE-ISSUANCE OF RFB. This RFB does not obligate the State or the Authority to establish eligibility for any bidders, or to issue any subsequent RFP's or enter into any agreements. The State reserves the right to cancel or re-issue this RFB at any time, and to solicit qualifications through any other appropriate method.

5.4 REJECTION OF PROPOSALS. The State may reject any response that the State deems to be incomplete, unresponsive to this RFB, significantly inaccurate in its representation or which is unacceptable to the State in the context of this RFB and the RFP's which are contemplated to be issued subsequently.

5.5 ONE PROPOSAL PER VENDOR. A bidder may submit only one response to this RFB. However, a bidder may be a subcontractor to any number of other bidders that may submit responses to this RFB.

5.6 SUBSTITUTIONS. Vendors may substitute or alter their responses subsequent to the submission date only if such changes are approved in writing by the State.

5.6 DURATION OF BIDS. The prices and capacities indicated in responses to this RFB shall be deemed to continue in effect for the time periods indicated in the responses unless the State agrees in writing to a change.

5.8 COST OF PROPOSAL AND NON-COMPENSATION. Each bidder is solely responsible for all costs associated with responding to this RFB. The State will not in any event reimburse any bidder for any costs associated with this RFB. The State reserves the right to make use of any information or ideas contained in the responses without compensation to the bidder.

5.9 DELIVERY OF PROPOSALS. Each bidder is solely responsible for assuring a timely submittal of its response. Late responses will not be accepted unless the State.

5.10 WITHDRAWAL OF PROPOSAL. Responses to this RFB may be withdrawn after submission by written request of the bidder's authorized representative prior to the date and time specified for response submissions. Proposals may be withdrawn and resubmitted in the same manner if done so prior to submission deadline.

5.11 DISPOSITION OF PROPOSALS; CONFIDENTIAL INFORMATION.

All submittals and the information therein become the property of the Authority upon submittal. Proposals shall be returned only at the Authority's sole discretion and at the vendor's expense. The Authority will employ reasonable efforts to hold portions of the responses specifically identified and marked as "Confidential" in confidence to the extent permitted by law, until such time as final awards are made and contracts signed pursuant to subsequent RFP's contemplated by this RFB, at which time these responses will become public records, available for review by the public. Upon request the Authority will return or destroy confidential information that is a trade secret or privately held company's financial information prior to announcing the selected suppliers. "

5.12 ENDORSEMENTS AND PRESS RELEASES. If a bidder is added to the eligibility list pursuant to this RFP, such bidder shall not issue any new releases or other statements pertaining to the award that state or imply the State's endorsement of such bidder's services or products without the written agreement of the State

5.13 KW. Wherever used herein the term 'kW' means kW of AC capacity measured as output from the inverter.

5.14 DISPUTES.

a) The parties shall deal in good faith and attempt to resolve potential disputes informally. If the dispute persists, contractor shall submit to the Executive Director or designee a written demand for a final decision regarding the disposition of any dispute between the parties arising under, related to or involving this contract, unless the State, on its own initiative, has already rendered such a final decision. Contractor's written demand shall be fully supported by factual information, and if such demand involves a cost adjustment to the contract, contractor shall include with the demand a written statement signed by an authorized person indicating that the demand is made in good faith, that the supporting data are accurate and complete and that the amount requested accurately reflects the contract adjustment for which contractor believes the State is liable. If the contractor is not satisfied with the decision of the Executive Director or designee, the contractor may appeal the decision to the Board Chair. In the event that this contract is for information technology goods and/or services, the decision may be appealed to an Executive Committee of State and contractor personnel.

b) Pending the final resolution of any dispute arising under, related to or involving this contract, contractor agrees to diligently proceed with the performance of this contract, including the delivery of goods or providing of services in accordance with the State's instructions. Contractor's failure to diligently proceed in accordance with the State's instructions shall be considered a material breach of this contract.

c) Any final decision of the State shall be expressly identified as such, shall be in writing, and shall be signed by the Executive Director or designee if an appeal was made. If the State fails to render a final decision within 90 days after receipt of contractor's demand, it shall be deemed a final decision adverse to contractor's contentions. The State's final

decision shall be conclusive and binding regarding the dispute unless contractor commences an action in a court of competent jurisdiction to contest such decision within 90 days following the date of the final decision or one (1) year following the accrual of the cause of action, whichever is later.

5.15 DISABLED VETERAN BUSINESS ENTERPRISES

The state established a 3% Disabled Veteran Business Enterprise (DVBE) Participation Goal to ensure a portion of the state's overall annual contract dollars are awarded to DVBEs. As a certified DVBE you are eligible for the state's 3% DVBE Participation Program, and, DVBE certification status strengthens business networking opportunities via the state's Internet Certified Firm Inquiry Services' certified DVBE query and listing. DVBE does not apply to this RFB, but will be applicable to subsequent RFP; issued by the Authority. Documentation is provided here for informational purposes.

To be eligible for certification your business:

- Must be at least 51% owned by one or more disabled veterans;
- Your daily business operations must be managed and controlled by one or more disabled veterans (the disabled veteran(s) who manages and controls the business is not required to be the disabled veteran business owner(s)); and,
- Your home office must be located in the U.S. (the home office cannot be a branch or subsidiary of a foreign corporation, foreign firm, or other foreign based business).

For certification purposes, a "disabled veteran" is:

- A veteran of the U.S. military, naval, or air service;
- Has a service-connected disability of at least 10% or more; and
- Must be a California resident.

Access the online Disabled Veteran Business Enterprise Certification Application (STD. 812), or to receive your hard-copy form by mail, e-mail osbcrhelp@dgs.ca.gov or call (916) 323-5478.

5.16 PREVAILING WAGE

The vendor, and any subcontractor thereof, shall pay the rate of wages for regular, overtime and holiday work plus employer payments for all benefits generally prevailing in the locality in which the work is to be performed, as determined by the State of California, Department of Industrial Relations, for all crafts, classifications or types of workmen used on the ordering agency premises at the point of delivery by the vendor, or subcontractor, for the assembly and installation of the materials purchased under this agreement.

5.17 PUBLIC WORKS

Bidders will be required to comply with the Special Conditions – Public Works requirements (Contracting License, Subcontractor Listing, and Worker's Compensation). See Form 3, Contractor Documentation.

Attachments

1. Draft Term Sheet for Solar Power Purchase Agreement
2. Typical State Installations
3. Minimum Solar Technical Specifications
4. Required bid response format +/- or forms
 - Form 1 – Technology Description
 - Form 2 – Price Bid
 - Form 3 – Contractor Documentation
5. Sample Master Lease and Solar Power Purchase Agreement

Appendices – Reference information regarding:

- A. General listing of major facilities each agency has, most recent compiled energy profile, location, and any information on identified for solar potential
- B. Table of relevant electric tariffs and peak-period prices
- C. Copies of agencies' letters of intent, subject to price offers
- D. Firms on CPA's 2002 Eligible Bidders List for Decentralized Solar

ATTACHMENT 1

DRAFT TERM SHEET - SOLAR POWER PURCHASE AGREEMENT

Draft 7/10/03

Project: The solar energy photovoltaic ("PV") system (the "Project") as fully described in the System Technology and Installation Specifications. The selected solar provider ("Provider") shall design, install, own and operate the Project to be located at _____'s ("Host") _____, CA facility. The Provider and Host intend to enter into a Master Agreement for the implementation of Projects at Host's designated facilities.

Project Feasibility Analysis:

Provider and Host will agree to an initial list of candidate facilities based on agreed screening criteria (e.g., location, size/load, utility rates and structure, age of roof, etc.). For these sites, Provider will arrange for feasibility analyses. If both parties deem a Project feasible and the price is acceptable to the host, the Provider and Host can agree to enter into an Energy Sales agreement for the development of a Project.

Energy Sales Agreement

Agreement: Provider and Host shall enter into an Energy Sales Agreement ("ESA") for the sale of PV generated electricity to reduce the amount of electricity that must be purchased from the local utility for Host's facility. The ESA shall define the roles and responsibilities of the Provider and Host and shall include the following terms:

Electricity Price: Electricity produced by the Project shall be priced at \$____/kWh

Operation and Maintenance:

The Provider will provide Operation and Maintenance services for the full term of the ESA. The cost for such services is included in the energy sales price.

Any ongoing Host required-repair or refurbishment to the vicinity of the facility where solar project is located will be at Host's expense and will not disrupt or impact the Project or Host's payment responsibility.

Term: 20 years (bidders may indicate additional pricing options for shorter or longer terms, if desired).

Ownership:	Provider shall own all incentives, tax credits, depreciation rights, renewable energy credits, emission credits and any other benefits created by the development of the Project.
Billing:	Provider shall invoice Host monthly for the electricity generated by the Project at the agreed upon rate multiplied by the kWh as measured by the Project's output meter. Payment shall be due within 45 days from the invoice date (as per California Government Code 927, California Prompt Payment Act). Incentives may be offered for earlier payment, e.g. within 30 days.
Insurance:	Provider shall carry full liability insurance for damage to the Project. Policy will include normal limitations on loss and exclusion of incidental loss or damage to the host site.
Early Termination/ Acquisition:	Host shall have the right to terminate the ESA by providing 60 days notice and payment of an early termination charge. The charge will be sized to maintain the expected financial return for the Project and to cover cost of system removal, if necessary. Such a charge will be included as a schedule to the ESA.
End of Term Provisions:	Host may enter discussions to purchase the Project for its fair market value at the end of the term. If this option is not exercised, Provider shall remove the equipment and restore the site to its original condition, unless both parties mutually agree to leave the equipment in place, with no further obligation on either party.
Budget Appropriation Clause	<p>If the state budget is late in its approval, the State agency shall not be obligated to make solar payments until such time as the budget is in effect, with retroactive payments due.</p> <p>If the Budget Act of the current year and/or any subsequent years does not appropriate sufficient funds for the program, the State shall have the option to either cancel this Agreement and incur the early termination clause, or offer an agreement amendment to Contractor to reflect altered terms. In either case the State shall have no other obligations under this Agreement, and Contractor shall not be obligated to perform any provisions of this Agreement.</p>

ATTACHMENT 2

TYPICAL INSTALLATION PARAMETERS FOR SOLAR ELECTRIC SYSTEMS ON STATE FACILITIES

The following should be considered generic site specifications for solar installations; permissible variations may be indicated.

250 kW Roof Top Configuration

1. Clear open roof area free from any obstructions.
2. No adjoining obstructions, such as other buildings, trees, etc.
3. Building height is no taller than a typical five-story building.
4. Assume orientation of building and roof area provides for maximum efficiency of solar power generation.
5. Assume that the slope of the roof is near perfectly horizontal (i.e. flat with considerations for drainage).
6. Employ flat panel construction technique (0 degrees of tilt to panels). [Bidders may propose alternate tilt, and specify angle in degrees to horizontal.]
7. Assume the roof is relatively new (within the first five years of a 20 year roof life).
8. Roof construction is a mineral cap sheet roof type with underlying waterproof membrane.
9. Roof penetrations are permitted, as long as coordinated with roofing company so as not to violate any roof warranty. Non-penetrating installations are permitted.
10. Assume that there are no structural issues that need to be considered (roof reinforcement, etc.)
11. Solar panels are fixed in position (no tracking). [Bidders may offer tracking systems, but must so specify, and provide pricing for this.]
12. Assume electrical interconnection facility is to be constructed 100 feet from the solar panels.
13. Location of the interconnection facility is inside the building (e.g. utility vault).
14. Interconnection facility includes typical interconnection equipment as required for a simple metered interconnection that provides for safe and reliable parallel operations with the local utility grid.

1 MW Ground Based Covered Parking System

1. Employ a low cost support structure.
2. Assume approximately 9 feet of height clearance.

3. No adjoining obstructions, such as other buildings, trees, etc.
4. Assume orientation of parking structure provides for maximum efficiency of solar power generation.
5. Solar panels are fixed in position (no tracking).
6. Employ flat panel construction technique (0 degrees of tilt to panels). [Bidders may propose alternate tilt, and specify angle in degrees to horizontal.]
7. Assume electrical interconnection facility is to be constructed 200 feet from the solar panels
8. Location of the interconnection facility is outside (e.g. substation).
9. Interconnection facility includes typical interconnection equipment as required for a simple metered interconnection that provides for safe and reliable parallel operations with the local utility grid.

1 MW Open Field Systems

1. No land acquisition or agreement maintenance fee costs.
2. Clear open field area free from any obstructions.
3. No adjoining obstructions, such as other buildings, trees, etc.
4. Solar panels are fixed in position (bidders can specify tracking, but must include in price quoted).
5. Assume orientation of panel structure provides for maximum efficiency of solar power generation.
6. Employ optimal tilt angle construction technique (e.g. 30 degrees of tilt to panels). (Note: this is a different specification than for roof and parking installations; bidders may quote a price at a different specified tilt.)
7. Employ a low cost support structure.
8. Assume electrical interconnection facility is to be constructed 500 feet from the solar panels.
9. Location of the interconnection facility is outside (e.g. substation).
10. Interconnection facility includes typical interconnection equipment as required for a simple metered interconnection that provides for safe and reliable parallel operations with the local utility grid.
11. Note: at Correctional facilities where installations may be made within the facility fence, but not in security areas, it will be necessary to pre-arrange installation schedules. There may be particular circumstances where access and/or oversight by a correctional officer must be specially arranged.

ATTACHMENT 3

MINIMUM TECHNICAL AND INSTALLATION SPECIFICATIONS

MINIMUM REQUIREMENTS

The conditions listed in this Exhibit should be considered as generally applicable to all sites. Host sites may discuss site-specific technical requirements with the selected Providers (see discussion of “variances” above).

Electric Power Requirements

The general requirements are:

- The power must be provided at 60 Hertz and at 120/240volts single-phase or 480 volts single-
- The guaranteed power capacity is measured at the inverter AC output using PVUSA Test Conditions (PTC), i.e., 1,000 Watts/m² irradiance, 20 degree C ambient temperature, and wind
- The system must include all hardware needed for the solar PV.
- All systems must be installed in accordance with all applicable requirements of local electrical codes and the National Electrical Code (NEC), including but not limited to Article 690.
- Systems must be designed and installed using UL or ETL listed components.
- Inverters must comply with the following requirements:
 - IEEE 929-2000, “Recommended Practice for Utility Interface of Photovoltaic (PV) Systems”; and
 - UL Subject 1741, “Standard for Static Inverters and Charge Controllers for use in Photovoltaic Power Systems”
- Other codes that will apply include:
 - AMSE PTC 50 (solar PV performance)
 - ANSI Z21.83 (solar PV performance and safety)
 - NFPA 853 (solar PVs near buildings)
 - NFPA 70 (electrical components)
 - UL 1741 (inverters and controllers)
 - IEEE 1547 (interconnections)
- All components, wiring, conduit, and connections must be rated for installation on the exteriors of the buildings, except for connections to existing electrical service panels (if necessary and appropriate). Inverters shall be housed in all-weather enclosures suitable for exterior location. A standard utility-grade kWh meter must be installed to measure the AC output of the inverter. This meter should be located in close proximity to the existing billing meter if at all possible and in a location accessible to utility personnel at each site.

- Interconnection must comply with “Rule 21” affecting the IOUs in California, or its equivalent used by municipal utilities in California. In all cases, interconnection must be acceptable to the servicing distribution utility or the energy service provider, as applicable. The state host site will cooperate with solar provider and, if necessary, will provide consents and execute with the local distribution utility such agreements as are necessary to permit the interconnection of the Energy System. Such shall be done at no cost or liability to State and provided further that solar provider shall reimburse State for all out of pocket costs incurred in connection with any interconnection agreement.
- For systems expecting to receive incentive payments via the IOU Self-Generation Incentive program, please also consult relevant reliability, warranty, and interconnection requirements of that program’s, cited in Section 1.7 of the RFB.

Meters

The Contractor will provide meters equivalent to hourly time interval meters and meter housings for each system. The State host site shall have access to data from these meters, no less frequently than a daily download of such data. Additional data (e.g. temperature, wind speed) and host site’s access to this may be offered and treated as a price variance item. [*Pat McCoy of DGS to provide more specific language on this; Len Pettis of CSUS may also have language from DA contracts.*]

Structural Requirements

All structures, including array structures, shall be designed to resist dead load, live load, plus wind and seismic loads for the area. Systems must be able to withstand wind speeds of at least 80 MPH. Also, thermal loads caused by expected fluctuations of component and ambient temperatures must be combined with all of the above load combinations.

All structural components, including array structures, shall be painted, coated, or otherwise protected in a manner commensurate with the minimum 30-year design life. Particular attention shall be given to the prevention of corrosion at the connections between dissimilar metals such as aluminum and steel. Because the photovoltaic system will most likely outlast the roofing materials, the structural installation design should provide for easy and cost-effective repair/replacement of the roof under the photovoltaic system.

Roof penetrations (to the extent incurred) must be waterproofed, and the bidder must provide at least a 10-year warranty against water leakage. Collaboration is required with the roofing professional responsible for the roof’s warranty at the facility. Systems must be designed to have minimum maintenance requirements and high reliability, to have a minimum 30-year design life, and to be designed for normal unattended operation.

Permits and Environmental Clearances

The Contractor will be responsible for meeting and obtaining all necessary state and local permits, licenses, approvals and/or siting variances that are required for the installation and operation of the project facilities and the delivery of the output energy.

Operations and Maintenance

The Bidder shall plan to provide state agency notification as early as practical (but in no event less than fifteen (15) days) prior to any planned downtime for maintenance and repairs. Bidder shall operate and maintain the solar system so as not to disrupt the operation of the State facility.

The State shall use commercially reasonable efforts to maintain the State facility in good condition and repair so as to be able to receive and utilize the solar electricity supplied by the proposed project.

Attachment 4 Required Bid Response Forms

Form 1 – Technology Description
Form 2 – Price Bid
Form 3 – Contractor Documentation

Form 1 Technology Description

Configuration: _____ (e.g. Roof, Carport, Open Field – *use separate page for each*):

Description of Solar System Component Offered (Manufacturer, model, size, type*, etc.) * E.g. single crystalline silicon or CIS thin-film	Maximum Turnkey Installed Capacity Offered (kW or MW)	
	2004	2005
Photovoltaic Array (or other Solar Collector) Materials		
Inverters		
Balance of System Components		
Specialized Structural Materials		
General Notes		
<p>The purpose of this Form is to provide sufficient information regarding the solar equipment items offered for consideration that the Authority and other public entities can quickly determine whether the equipment offered will meet their specific needs. Bidders must indicate the volume of installations (number of projects and total MW installed) that they can commit to providing each year. Bidder may submit supplemental information and specifications for each equipment item offered as a separate enclosure. Bidder may submit additional pages as required.</p>		

Form 2 Price Bid

TECHNOLOGY	ROOF-MOUNT (NON- PENETRATING PREF.)	CARPORT (W/ SUPPORT STRUCTURE)	OPEN FIELD GROUND- MOUNT
Average efficiency	[\$ / kWh]	[\$ / kWh]	[\$ / kWh]
High efficiency	[\$ / kWh]	[\$ / kWh]	[\$ / kWh]

PRICING STRUCTURE

For bidders not providing a fixed energy price, please provide your projection of prices over the proposed term. Bidder should indicate if the future prices are fixed, and if not, what factors will influence the price (e.g., changes in the then applicable utility tariff). Bidders should attach a projection of their energy prices to their proposal. Bid prices will be discounted to a present value for ranking purposes.

PRICING VARIANCES

There is a strong preference for little or no variance in pricing. To the extent bidders include variances in their prices due to specific project parameters (e.g., location, size of installation), please define how and when such variances are to be applied. Please provide examples of projects where such adders or subtractors would be applied.

The following is a sample of how variances could be applied:

	BASE LEVEL	POSITIVE VARIANCE	NEGATIVE VARIANCE
Avg. Annual Solar Hours	1,200 – 1,800 hours	Add \$.01/kWh for each 100 hours below 1,200 hours	Subtract \$.01/kWh for each 100 hours above 1,800 hours
Size of System (kW)	100 – 500 kW	Add \$.01/kWh for each 50 kW below 100 kW	Subtract \$.005/kWh for each 200 kW above 500 kW

Please note that final criteria may provide explicit scoring “bonus” for:

- no or minimal variances
- variable pricing tied to the then-current tariff

Form 3
Contractor Documentation

MUST BE COMPLETED AND SUBMITTED

This solicitation is for equipment that must be installed at a State Agency's site by the successful bidder. In accordance with the California Contractor's License Law, in order for a bid to be considered responsive, the bidder must possess a valid contractor license, of the proper classification, at the time of bid opening. (Business and Professions Code, B&P 7028.15)

To the extent that sub-contractors will vary depending upon the geographic location of the solar project sites, this form may be completed now for the statewide installation contractor(s), and can be further refined at a later date for individual agency agreements.

Statement of Work

Installation of on-site solar electrical systems, as prescribed

License Requirements

The following license(s) is required for this solicitation:

- At a minimum, the installation contractor must have a C-46 solar contractor license.
- If any systems are installed pursuant to CEC incentives (e.g. up to 30 kW), the CEC's "Emerging Renewables Program Guidebook" requires that contractors must have an active A,B, or C-10 license, or a C-46 license for photovoltaic systems. In addition, the CEC requires that contractors be certified to the testing requirements of the photovoltaic protocols that the North American Board of Certified Energy Practitioners is in the process of establishing.
- For ground-mounted solar installations, a Class B license is required.

Contracting law states that a prime contract cannot be awarded to a specialty contractor whose classification constitutes less than a majority of the project. B&P 7059(b) however, required work that is incidental and supplemental to the project may be undertaken by the specialty contractor even though that contractor does not hold those specific specialty licenses. A licensed subcontractor in accordance with the Public Contract Code Section 4100, et. seq, must perform all other work.

Incidental and supplemental is defined as work essential to accomplish the work in which the contractor is classified. A specialty contractor may use subcontractors to complete the incidental and supplemental work, or he may use his own employees to do so. (California Code of Regulations CCR 831)

Bidder's Contractors License Number _____

License Issued to Whom _____

Relationship of Bidder to License Holder _____

Classification _____

Expiration date _____

The bidder, by their signature on the Invitation for Bid, certifies under penalty of perjury the accuracy of the representations made on the bid form with regard to the contractor's license number(s), class, status in good standing and the expiration date.

***Subcontractors**

Name/Address _____

License

No. _____

Classification _____

Expiration date _____

Name/Address _____

License

No. _____

Classification _____

Expiration date _____

Name/Address _____

License

No. _____

Classification _____

Expiration date _____

*Attach further detail for additional entries.

Other Requirements

The bidder shall comply with the Laws and Regulations governing the payment of prevailing wage as identified in the Labor Code, Part 7 (Public Works and Public Agencies), Chapter 1 (Public Works). Copies of the prevailing rate of per diem wages are on file at the Department of General Services Procurement Division headquarters and shall be made available to any interested party on request.

The state reserves the right to approve subcontractors.

Workman's Compensation Certification

By signing and submitting a bid, the bidder certifies that they are aware of the provisions of Section 3700 of the Labor Code which requires every employer to be insured against liability for workman's compensation or to undertake self-insurance in accordance with the provisions of that Code, and will comply with such provisions before commencing the performance of the work of this contract.

Attachment 5
Sample Master Agreement – Lease and Solar Power Purchase Agreement

Please download separate file from CPA web site:

<http://www.cpowerauthority.ca.gov/DistributedGeneration/default.htm>

APPENDIX A
General Description of State Agency Facilities and Electrical Loads That May Participate in Program, With General Statement of Representative Locations

(Note: there will be different levels of information available by agency)

Agency or Department	Site List	City Location	Most Recent Year Peak KW Demand	Most Recent Year kWh	Data Year	Estimated Usable Roof (sq ft)	Estimated Potential Solar Gross Output (kW)
Calif. Dept. of Transportation							
	DISTRICT 1:	Eureka	487	3,240,414	FY-00-01		
	DISTRICT 2:	Redding	666	3,359,246	FY-00-01		
	DISTRICT 3:	Marysville	1,834	13,537,179	FY-00-01		
	DISTRICT 4:	Oakland	4,040	21,591,333	FY-00-01		
	DISTRICT 5:	San Luis Obispo	695	3,887,575	FY-00-01		
	DISTRICT 6:	Fresno	1,069	6,316,537	FY-00-01		
	DISTRICT 7:	Los Angeles	3,069	16,066,149	FY-00-01		
	DISTRICT 8:	San Bernardino	1,874	8,160,356	FY-00-01		
	DISTRICT 9:	Bishop	1,023	6,696,322	FY-00-01		
	DISTRICT 10:	Stockton	821	5,011,421	FY-00-01		
	DISTRICT 11:	San Diego	1,380	7,798,697	FY-00-01		
	DISTRICT 12:	Orange County	175	1,533,095	FY-00-01		
	DISTRICT 22:	Sacramento Headquarters	2,875	11,804,260	FY-00-01		
	Totals:		20,008	109,002,584			
	Data Notes: Estimated kW based on assumed load factor of Data for 2000,2001 provided by DOT.						
	Above data are district totals. Main building in each district has peak load of 250 - 450 kW, with exception of 3 high-rise buildings in LA, San Bernardino and Oakland.						

Agency or Department			Most Recent			Estimated	Estimated Potential
	Site List	City Location	Year Peak KW Demand	Most Recent Year kWh	Data Year	Usable Roof (sq ft)	Solar Gross Output (kW)
California State University System							
	CSU Bakersfield	Bakersfield	1,936	13,067,462	FY-00-01		
	CSU Channel Islands	Channel Islands	572	3,858,860	FY-00-01		
	CSU Chico	Chico	4,656	31,430,199	FY-00-01		
	CSU Dominguez Hills	Dominguez Hills	1,802	12,163,248	FY-00-01		
	CSU Fresno	Fresno	5,486	37,032,076	FY-00-01		
	CSU Fullerton	Fullerton	6,902	46,584,142	FY-00-01		
	CSU Hayward	Hayward	2,979	20,111,027	FY-00-01		
	CSU Humboldt	Humboldt	1,967	13,276,300	FY-00-01		
	CSU Long Beach	Long Beach	7,074	47,750,528	FY-00-01		
	CSU Los Angeles	Los Angeles	5,064	34,181,213	FY-00-01		
	CSU Maritime Academy	Maritime Academy	652	4,398,937	FY-00-01		
	CSU Monterey Bay	Monterey Bay	1,684	11,368,808	FY-00-01		
	CSU Northridge	Northridge	7,115	48,025,670	FY-00-01		
	CSU Pomona	Pomona	6,003	40,519,927	FY-00-01		
	CSU Sacramento	Sacramento	5,127	34,604,231	FY-00-01		
	CSU San Bernardino	San Bernardino	2,907	19,621,633	FY-00-01		
	CSU San Diego	San Diego	7,312	49,356,058	FY-00-01		
	CSU San Francisco	San Francisco	3,959	26,720,587	FY-00-01		
	CSU San Jose	San Jose	4,702	31,736,973	FY-00-01		
	CSU San Luis Obispo	San Luis Obispo	5,543	37,412,382	FY-00-01		
	CSU San Marcos	San Marcos	1,204	8,129,718	FY-00-01		
	CSU Sonoma	Sonoma	2,142	14,456,577	FY-00-01		
	CSU Stanislaus	Stanislaus	1,695	11,439,099	FY-00-01		
	CSU Stanislaus/Stockton	Stanislaus/Stockton	819	5,530,466	FY-00-01		
	CSU Chancellor's Office		698	4,710,515	FY-00-01		
	Totals:		90,000	607,486,636	FY-00-01		
	Data Notes: Estimated kW based on assumed load factor of 00-01 electricity and natural gas usage and average prices per CSU Chancellor's Office.						

Agency or Department	Site List	City Location	Most Recent Year Peak KW Demand	Most Recent Year kWh	Data Year	Estimated Usable Roof (sq ft)	Estimated Potential Solar Gross Output (kW)
Dept. of General Services	Primary Facility List						
	Bateson Building	Sacramento	565	2,961,000	FY-00-01	33,000	188
	Board of Equalization	Sacramento			FY-00-01	0	0
	EDD (Solar) Annex	Sacramento	613	3,212,000	FY-00-01	12,600	72
	EDD HQ Building	Sacramento	927	4,853,000	FY-00-01	29,000	165
	Energy Commission Building	Sacramento	286	1,496,000	FY-00-01	18,000	103
	Edmund G. Brown Building (CPUC)	San Francisco			FY-00-01	30,000	171
	Fresno OB&G State Office Bldg (Hugh M. Burns Bldg)	Fresno			FY-00-01	22,000	125
	Mission Valley State Office Bldg	Mission Valley			FY-00-01	42,000	239
	Office Building 8	Sacramento			FY-00-01	0	0
	Office Building 9	Sacramento			FY-00-01	0	0
	Santa Rosa State Office Building	Santa Rosa	180	942,240	FY-00-01	15,000	86
	Totals for Primary Facility List					201,600	1,149
	Secondary Facility List						
	Bonderson Building (WRCB)	Sacramento	384	2,011,087	FY-00-01	0	0
	DWR Fresno Annex	Fresno	72	374,441	FY-00-01	17,500	100
	Junipero Serra State Bldg	Los Angeles	984	5,151,562	FY-00-01	0	0
	Legislative Office Building	Sacramento			FY-00-01	25,000	143
	Resources Building	Sacramento	1,933	10,119,836	FY-00-01	0	0
	Ronald Reagan Building	Los Angeles	2,616	13,695,840	FY-00-01	0	0
	San Francisco Civic Center	San Francisco	1,989	10,417,370	FY-00-01	17,000	97
	Santa Ana State Office Building	Santa Ana	285	1,492,951	FY-00-01	10,000	57
	Van Nuys State Office Building	Van Nuys	367	1,922,880	FY-00-01	24,000	137
	Totals for Secondary Facility List				FY-00-01	93,500	533
	Total Solar PV Project Potential						
DGS Data Notes: <ol style="list-style-type: none"> 1) Estimated Usable Roof figures derived from analyzing total square footage, number of floors, aerial photos, accounting for roof mounted equipment, and conservative math. 2) Estimated Effective Output based on "average" solar photovoltaic technology that is currently commercially available. It is understood that products with greater efficiencies are available. These figures are conservative and actual output may be greater depending on the technology utilized. 3) Facility selection for identification of solar PV opportunities excluded buildings that are greater than 10 floors in height due to added project related costs, or where the roof configuration was clearly not conducive to the installation of solar PV panels. 4) Parking garage structures, parking lots, and warehouses were not evaluated for the RFP. There is opportunities for these facilities that could be further explored. This RFP did not consider ground mounted systems, only roof mounted systems. 							

Agency or Department	Site List	City Location	Most Recent Year Peak KW Demand	Most Recent Year kWh	Data Year	Estimated Usable Roof (sq ft)	Estimated Potential Solar Gross Output (kW)
Department of Mental Health	Most facilities are multi-building, low-rise campus-style						
	Atascadero State Hospital	Atascadero	2832	12,360,000	FY 02-03		
	Metropolitan	Norwalk	1802	9,935,541	FY 02-03		
	Napa (has on-site cogen)	(PG&E serves)	1346	12,000,000	2001		
	Patton	(SCE serves)	2900		FY 02-03		
University of California	UC Office of the President	Oakland	920	3,525,721	FY-00-01		
	UC Berkeley	Berkeley	30,069	177,454,182	FY-00-01		
	UC Davis	Davis	24,000	197,713,899	FY-00-01		
	UC Davis Medical Center	Sacramento	356	1,087,062	FY-00-01		
	UC Irvine	Irvine	21,376	114,032,500	FY-00-01		
	UC Irvine Medical Center	Irvine	7,612	36,030,263	FY-00-01		
	UC Los Angeles	Los Angeles	10,000	63,010,595	FY-00-01		
	UC Riverside	Riverside	9,000	51,806,408	FY-00-01		
	UC San Diego	San Diego	32,601	209,573,759	FY-00-01		
	UC San Francisco	San Francisco	15,018	35,930,564	FY-00-01		
	UC Santa Barbara	Santa Barbara	14,187	85,435,900	FY-00-01		
	UC Santa Cruz	Santa Cruz	5,064	27,892,159	FY-00-01		
	Totals		170,204	1,003,493,011			
Data Notes:							
Estimated kW based on assumed load factor of 2000-01 electricity and gas usage per UC chancellor's office							

Agency or Department	Site List	City Location	Most Recent	Most Recent Year	Data Year	Estimated Usable Roof (sq ft)	Estimated Potential Solar Gross Output (kW)
			Year Peak KW Demand				
Youth & Adult Corrections	Avenal		4,159	23,504,921	FY-00-01		
	Calipatria	Calipatria	7,620	32,029,720	FY-00-01		
	Centinela	(El Centro)	7,620	34,624,360	FY-00-01		
	Chuckawalla	(Blythe)	3,778	22,557,234	FY-00-01		
	Corcoran	Corcoran	11,148	66,816,546	FY-00-01		
	Correctional Institute (	Tehachapi)	3,272	19,363,025	FY-00-01		
	Correctional Training Facility	(Soledad)	2,387	14,178,200	FY-00-01		
	Deuel (	Tracy)	2,278	12,343,451	FY-00-01		
	Donovan (	San Diego	547	5,388,645	FY-00-01		
	Folsom	Folsom	5,732	29,925,719	FY-00-01		
	High Desert (	Susanville	4,512	26,383,545	FY-00-01		
	Institution for Men		1,484	2,949,841	FY-00-01		
	Institution for Women (	Stockton	879	5,347,028	FY-00-01		
	Ironwood (	Blythe)	4,672	28,487,500	FY-00-01		
	Los Angeles (	Lancaster)	3,891	21,001,545	FY-00-01		
	Mens Colony	(San Luis Obispo)	2,356	12,571,200	FY-00-01		
	Mule Creek	(Ione)	3,777	19,298,580	FY-00-01		
	Pelican Bay (	Crescent City	3,643	19,518,661	FY-00-01		
	Pleasant Valley (	Coalinga)	3,748	2,046,631	FY-00-01		
	Rehabilitation Center (	Norco)	1,646	10,745,591	FY-00-01		
	Salinas	Salinas	656	16,171,488	FY-00-01		
	San Quentin	San Rafael/Larkspur	2,300	11,520,300	FY-00-01		
	Sierra (	Jamestown	2,046	12,731,011	FY-00-01		
	Susanville	Susanville	2,319	12,405,238	FY-00-01		
	Valley State Prison for Women (Chowchilla)	Chowchilla)	3,613	28,253,506	FY-00-01		
	Wasco	N. of Bakersfield	3,525	18,668,896	FY-00-01		
	California Medical Facility (	Vacaville	10,738	22,455,050	FY-00-01		
	California State Prison, Solano (	Vacaville)	1,498	8,630	FY-00-01		
	Calif State Pris, Sacramento (	Represa, New Folsom)	0	17,136,214	FY-00-01		
	Folsom State Prison, Represa (	Represa, Old Folsom)	8,012	14,437,942	FY-00-01		
	Galt Training Center (	Galt)	300	2,120,508	FY-00-01		
	North Kern State Prison, Delano (	Delano)	2,006	17,207,859	FY-00-01		
	Totals:		93,607	508,832,382	FY-00-01		

APPENDIX B
TABLE OF RELEVANT TARIFFS AND TIME-DIFFERENTIATED POWER
PRICES DURING SOLAR HOURS

(Provided for reference and not guaranteed to be correct as shown)

Electric Tariff as of 6/03					
Time of Use tariffs unless otherwise stated	Summer Peak \$/kWh	Winter Mid Peak \$/kWh		Solar Weighted* (energy only)	Solar Weighted* (energy + demand)
<u>PG&E:</u>					
A-6 (TOU)	\$0.3432	\$0.1711		\$0.222	\$0.222
A-10 (no TOU)	\$0.1596	\$0.1117		\$0.140	\$0.140
E-19 (TOU)	\$0.1884	\$0.1152		\$0.140	\$0.160
E-20 Secondary	\$0.1841	\$0.1039		\$0.130	\$0.149
E-20 Primary	\$0.1591	\$0.0974		\$0.118	\$0.135
E-20 Transmission	\$0.1545	\$0.0953		\$0.115	\$0.124
<u>SCE:</u>					
GS-2 (Option A)	\$0.2960	\$0.1296		\$0.177	\$0.189
TOU-8 (<2kV)	\$0.2021	\$0.1239		\$0.149	\$0.189
TOU-8 (2-50kV)	\$0.1954	\$0.1212		\$0.146	\$0.186
TOU-8 (>50kV)	\$0.1829	\$0.1100		\$0.134	\$0.152
<u>Proposed SCE Rates (for fall 2003):</u>					
GS-2 (Option A)	Na	Na		Na	Na
TOU-8 (<2kV)	Na	Na		Na	Na
TOU-8 (2-50kV)	\$0.1379	\$0.0889		\$0.106	\$0.141
TOU-8 (>50kV)	\$0.1210	\$0.0756		\$0.091	\$0.109

*Solar weighting based on sample 225kW solar installation in Daggett, CA.

APPENDIX C
COPIES OF AGENCIES' LETTERS OF INTENT TO PARTICIPATE IN
PROGRAM, SUBJECT TO PRICING

Please see separate .pdf file, which can be downloaded from CPA web site:

<http://www.cpowerauthority.ca.gov/DistributedGeneration/default.htm>

APPENDIX D

FIRMS & TEAMS ON CPA'S 2002 ELIGIBLE BIDDERS LIST FOR DECENTRALIZED SOLAR – INFORMATIONAL ONLY

*(The CPA's 2003 Third-Party Request for Bids is open to all bidders,
not limited to this list, nor to these combinations of bidders/suppliers)*

Lead Bidder	Manufacturers and Type of System/Materials
Advanced Energy Systems, Ltd (AES)	AES 250 KVA, 150 KVA, 100 KVA Inverters
Alpha Technologies Inc.	BP Solar - BP2150S Polycrystalline or monocrystalline
Amoco Technology Company (BP Solar)	BP Solar Multiple modules, Cadmium Telluride (cdTe) thin film Poly and Single-crystalline
ASE America, Inc.	ASE 300 watt Polycrystalline silicon
AstroPower, Inc.	AstroPower 130 watt P+B134polycrystalline silicon
Bekaert ECD Solar Systems LLC (Uni-Solar)	Bekaert ECD PVL-128 and PVL-64 Multi-junction Amorphous silicon
Chevron Energy Solutions	Bekaert ECD PVL-128 and PVL-64 Polycrystalline and Amorphous silicon
Commonwealth Energy Corporation	Kyocera - KC120-1 Uni-Solar - SSR128 Single crystalline Amorphous back-up
EcoEnergies Inc. (ECO)	Photowatt/Matrix Solar PW1000 - 105 Multi-crystalline silicon; B585V Single crystal silicon
Electric Stars	Electric Stars 160 watt Polysilicon
First Solar, LLC	First Solar Thin film Cadmium Telluride (cdTe)
FlexEnergy, Inc.	Multiple Trough and Turbine Suppliers Solar trough organic Rankin electric system (STORES)
Kyocera Solar Inc.	Kyocera KC120-1 and KC80 Multi-crystalline
Light Energy Systems	ASE Americas 300 watt Single crystalline
PowerLight Corporation	Multiple manufacturers and suppliers Single or polycrystalline

Appendix D (continued)

Lead Bidder	Manufacturers and Type of System/Materials
RealEnergy	Multiple PV manufacturer and suppliers Single crystalline
Renewable Energy Concepts, Inc.	AstroPower AP100, AP7105 Single crystalline
Renewable Technologies, Inc.	BP Solar, Sanyo MSX120 watt, Solex 180 watt Polycrystalline and Thin Layer
Schott Applied Power Corp. (SAPC) (now RWE Schott Solar)	Siemens and SAPC 165 watt Single crystalline and polycrystalline
Siemens Solar Industries, LP (now Shell Solar Industries)	Siemens - SP25 Copper/Indium/Gallium/Di-Selenide (CIGS) Thin film
SMA America Inc.	SMA SWR 2500V, SWR 2500+B73, and CWR 100 Inverters
SUN Utility Network, Inc.	Sharp 160 watt Polycrystalline
TerraSolar USA, Inc. (CAL-Solar)	CAL Solar DS-40, EPU-40, CS-40 Amorphous silicon
TruePricing, Inc.	Multiple manufacturer and suppliers Single crystalline and multi-crystalline
TSS Consultants, Inc.	SolarBee, Siemens SM55 55 watt Single silicon
Viridian Energy Corporation (formerly V*SEE)	Viridian Copper/Indium/Gallium/DiSelenide (CIGS)